2020

A Quality Improvement Project to Reduce Stigma and Increase Awareness of Resources to Decrease Barriers to Accessing Mental Health Care for Nurses

Samantha Charles

A Quality Improvement Project to Reduce Stigma and Increase Awareness of Resources to Decrease Barriers to Accessing Mental Health Care for Nurses

Samantha Charles

University of Massachusetts, Amherst

College of Nursing

DNP Project Chair: Mary Ellen Burke, DNP, RN, CNM

DNP Project Mentor: Carson Burns, MSN, RN

Date of Submission: March 10th, 2019

Table of Contents

Abstract

Background: Mental health disorders affect 20% of adults in the United States and nurses experience mental illness and substance abuse at rates that are similar or higher to the general population. Due to the stressful and emotionally demanding nature of their profession, nurses are at a higher risk for developing or exacerbating mental health disorders. Mental health stigma and lack of awareness of resources are both significant barriers to accessing mental health care. Evidence has shown positive results with providing education about mental illness and increasing awareness of and access to resources for mental healthcare, self-care and stress management. *Purpose:* To decrease the barriers and stigma related to accessing mental health care among acute care registered nurses. *Method:* A unit based educational intervention was delivered to nurses in an acute care setting. The nurses completed The Opening Minds Scale for Health Care Providers (OMS-HC) questionnaire to assess baseline mental health knowledge, attitudes, and willingness to seek treatment. An educational presentation was provided immediately after the pre-questionnaire. Education and resources about mental health treatment, self-care, and stress management were also available around the unit. After one month, the nurses completed the same questionnaire and results were analyzed to assess for change. *Results:* A slight decrease in stigma and increase in willingness to seek mental health care was shown one month after the educational intervention. The qualitative data presented with two common themes: curiosity about the topic and openness to discuss mental health. *Conclusion:* Nurses are crucial to the healthcare system and should prioritize their mental healthcare to improve patient outcomes and live overall healthier and happier lives. Consistent education and awareness are needed to decrease stigma and increase willingness to seek care.

Keywords: *mental illness, mental health disorders, stigma, healthcare, barriers, nurses*

A Quality Improvement Project to Reduce Stigma and Increase Awareness of Resources to Decrease Barriers to Accessing Mental Health Care for Nurses

Introduction

Mental health disorders (MHD), also called mental illness, can range from mild to severe and can be defined as a blend of abnormal thinking, perceptions, emotions, behavior and relationships with other people (World Health Organization, 2018). It affects roughly 20% of the adult population in the United States (U.S.) and results in more disability when compared to other illnesses such as cancer or cardiovascular disease (NIMH, 2017b; Cares, Pace, Denious, & Crane, 2014). Depression and anxiety disorders are the most common MHD with depression affecting 7.1% of the all adults in the U.S. and anxiety disorders affecting an estimated 31.1% of adults in the U.S. (NIMH, 2019; NIMH, 2017a). Nurses experience anxiety and depression more than any other mental health disorder (Perry, Lamont, Brunero, Gallagher, & Duffield, 2015). Nurses deal with intense levels of stress, exhaustion, fatigue, and burnout due the responsibilities of their profession (Tsaras et al., 2018). In spite of the fact that stress is an adaptive response for survival, when stress is persistent, it can contribute to physical and psychological conditions (Stathopoulou, Karanikola, Panagiotopoulou, & Papathanassoglou, 2011).

It has been reported that nurses experience substance abuse and mental illness at similar or higher rates than the general population (Cares et al., 2014). However, the traditional approach to nursing health care issues is typically reactive as it focuses on offering resources, counseling services, or employee assistance programs ‘after the fact’ when in reality, it would be more beneficial to be proactive and promote awareness of these programs, resources and wellness screenings consistently to the nurses throughout their career (Perry et al., 2015). Research is limited on the percentage of nurses who receive mental health treatment, but in the United States;

less than half of all adults living with MHD have received treatment in the past year (NIMH, 2017). With nursing being the largest profession in healthcare, it's imperative that they receive support and services for managing both their physical and mental health (Perry et al., 2015).

Background

Acute care nurses typically work long hours (12-hour shifts) and inconsistent work schedules. They may spend a large portion of their shifts on their feet with limited time for breaks to eat, hydrate, or use the bathroom. Nurses may even prioritize carrying out necessary tasks/procedures for their patients in a prompt and timely manner over the care for their own health, especially with regards to occupational hazards such as finger sticks or bodily fluid exposures and their mental health (Vasconcelos et al., 2016). This, in combination with the stress of caring for sick patients, constant exposure to death, trauma or violence, carrying out different prescribed treatments for each patient, having difficult conversations with family members, intense role strain, high expectations from upper management, lack of supervisor support, workplace bullying, and professional dissatisfaction can all contribute to high levels of stress, decreased quality of life, and professional burnout (Vasconcelos et al., 2016). This may then result in behavioral alterations including apathy, irritability, anger, careless behavior, tardiness, or missing working completely. The continual stress can decrease productivity and quality of care for the patient which may ultimately lead to poor patient outcomes (Stathoupoulou et al., 2011). Additionally, this may impact nurses' overall health, well-being, and quality of life outside of work impacting their relationships with friends and family.

Not only can the stress and trauma experienced by nurses impact their mental health and lead to mental illness, but nurses with a previous history of a mental health disorder may be triggered due to the work environment, stress, and responsibilities of their job. Departments such

as the intensive care unit (ICU) and the emergency department are specialized to care for a wide range of patients; some who are combative, critically ill, severely injured, actively dying, or already dead upon arrival. Nurses caring for these patients witness trauma and death on a regular basis and may begin to experience anxiety, and other stress symptoms that can exacerbate mental health disorders (Ong, Siddiqui, John, Chen, & Chang, 2016; Nooryan, Gasparyan, Sharif, & Zelda, 2012).

Nurses working in oncology also experience high levels of stress, burnout or compassion fatigue (Jones, 2017). Depending on an oncology patient's cancer or treatment regimen, these nurses may care for that patient for months or even years; and the emotional toll this can have on a person can be significant. Instead of utilizing self-care or stress management resources, self-help interventions, or professional treatment, some nurses develop negative coping mechanisms including substance abuse or denial (Ong et al., 2016).

There is an obvious need for mental health education, resources and treatment for acute care nurses as evidence has shown that they experience high levels of stress that can result in mental illness. However, there are significant barriers that make it difficult for nurses to access mental health resources. Specific barriers to nurses include long work hours, varying schedules, and overnight shifts. For example, acute care nurses typically work 12-hour shifts which leave them very little time at the end of the day to go to appointments, go to the bank, or do any other necessary errands. For the nurses who work over night, they require sleep during the day. It is common knowledge that attaining a sufficient amount of sleep on a regular basis is crucial for optimal mental health; but this may leave night shift nurses with limited opportunities to go to appointments or access resources that are only available during the daytime (Maski, 2018). Also, in rural communities, there may be limited mental health providers or resources and nurses may

only have the option to see a provider that they work with or may run into patients that they have cared for in the past.

Lack of accurate knowledge of mental health disorders and how to access treatment have also been proven to be substantial barriers for individuals (Hanisch et al., 2016). Many organizations offer mental health resources for their employees (e.g., Employee Assistance Programs (EAP), health care benefits) but employee utilization is often low due to lack of awareness or lack of recognition of how these resources could be beneficial for stress management, burnout and mental healthcare (Oakie, Smith, Dimoff, & Kelloway, 2018). Utilization of these programs may also be low due to the fear that their confidentiality will not be respected.

The stigma related to mental illness has also been identified as one of the most significant barriers to accessing treatment (Knaak, Mantler, & Szeto, 2017). Stigma is the negative perception, disapproval, and/or discrimination of a group of people solely due to the certain features they possess (Mazurek & Papuć, 2018). Mental illness stigma can then be defined as the negative perceptions, disapproval, and/or discrimination toward people with mental illness (Mazurek & Papuć, 2018). The stigma around mental illness can be a powerful deterrent for seeking treatment and care as mental illness may often be viewed in a negative light. When compared to other disorders, people with MHD have received the most judgement and stigmatization partly due to the media's overwhelming inaccurate and undesirable beliefs and perceptions of mental illness (Rössler, 2016).

Not only do individuals with MHD experience this stigma from the general public, but they also experience this stigma from healthcare professionals, others with mental illness, and themselves (Rössler, 2016). Studies have shown that people with mental illness not only have the

burden of trying to cope with their mental illness and the related symptoms, distress, and daily impact to functioning, but they also have to cope with the stigma of mental illness (Maranzan, 2016). People are more likely to perceive an individual as violent and unpredictable if they have a diagnosis of a mental health disorder and may avoid or isolate them because of these negative perceptions (Henderson et al., 2013; Greenstein, 2017). Individuals with mental health disorders may feel defined by or responsible for their conditions (Greenstein, 2017). When individuals with MHD internalize this stigma, this can then create a sense of self-stigma where they may experience feelings of shame, low self-esteem, and diminished self-efficacy which can negatively influence the individual's willingness to seek help putting them at risk for a less successful recovery (Rössler, 2016). When asked about barriers to seeking assistance, a recent study showed that more than 50% of the respondents reported they would be too scared, too embarrassed, and were worried about the confidentiality and who would find out about their mental illness (Cares et al., 2014). The fear and embarrassment are truly crippling and prevents many from accessing the treatment and help that they desperately need.

Problem Statement

The types of stress experienced by nurses in the acute care environment increases the risk for development or exacerbation of MHD. Some of the most common barriers to accessing mental health resources include mental illness stigma and the lack of awareness of mental health resources. The purpose of this project is to decrease barriers to accessing mental healthcare by reducing stigma and increasing awareness.

Review of Literature

Description of Search Method

A comprehensive search of the literature included the following databases: Google Scholar, CINHAL, PsycINFO, andPubmed.gov. The National Alliance of Mental Illness (NAMI) was also used for review. The search terms included mental illness, mental health disorders, stigma, healthcare, self-care, barriers, and nurses. This resulted with 413,298 articles. Inclusion criteria consisted of full-text peer reviewed articles, published in English within the last ten years. Articles were organized by best match and were filtered to include studies on stigma, mental health promotion, awareness, and self-care among nurses and other healthcare professionals. References in relevant articles were also screened for publications that might be acceptable for inclusion. Articles solely discussing substance abuse or severe mental health disorders (eg. Schizophrenia, bipolar disorder, etc.) were excluded.

The Johns Hopkins nursing evidence-based practice rating scale was utilized to critique the level of evidence for each article included in this review. The strength of evidence for each article chosen had a range from a level I to a level IV, which includes randomized control trials, non-experimental studies and systematic reviews. The inclusion criteria included articles of either good or high-quality levels of evidence. Based on these guidelines, nineteen articles were chosen for review.

The review of the literature presented with several themes. The first theme discusses the healthcare profession as a whole and how stress and extensive work demands in these professions can negatively impact mental health and can cause or exacerbate mental illness. The second theme discusses major barriers to accessing mental health care which include stigma and lack of knowledge about resources. The third theme discusses specific interventions to decrease

these major barriers of accessing mental health care. These interventions include reducing mental health stigma by improving mental health literacy and increasing awareness of and access to resources about mental health care, self-care, and stress management.

Stress and work demands. The first theme from the review of the literature discusses how the stress and work demands in the health care profession can lead to mental illness and if left untreated or unaddressed, how it can result in decreased productivity at work, negative patient outcomes, poor coping mechanisms, and debilitation (Cares et al., 2015; Stubbs, 2014, Knaack et al., 2017; Vasconcelos et al., 2016). Nurses working in critical care units, oncology, the emergency department, and other acute care units treat patients with a variety of different conditions and may experience trauma and death as a regular part of the job.

Nurses may regularly come in contact with patients who are combative or verbally abusive and these experiences can trigger or exacerbate mental health disorders (Ong, Siddiqui, John, Chen, & Chang, 2016; Nooryan, Gasparyan, Sharif, & Zladl, 2012). In response to the high levels of stress and work demands, nurses may use substance abuse as a coping mechanism for the symptoms of mental illness and which may lead to negative patient outcomes, negative personal and professional outcomes for the nurse, or death (Ong et al., 2016; Cares et al., 2015).

Barriers to accessing mental healthcare. Mental illness stigma is debilitating and a significant deterrent to accessing help and treatment. Knaak et al. (2017) and Maranzan (2016) both discuss how substantial of a barrier stigma is for individuals to seek out mental healthcare. This is even true among healthcare professional in spite of the fact that they are typically more knowledgeable about mental health and regularly care for patients with mental health issues (Knaak et al., 2017; Maranzan, 2016). Although nurses receive education about mental health,

prevention, symptoms, and treatment, they may be reluctant to seek help due to the fear and embarrassment because of mental illness stigma.

Individuals with mental health disorders may often be considered incapable, unpredictable, or unable to make rational decisions; which may influence a nurse's decision to seek help/treatment or discuss their conditions with their employer or co-workers (Greenstein, 2017; Henderson et al., 2013). Mental illness stigma can be so powerful that some may even be unwilling to work with an individual with depression (a common mental health disorder) (Hanisch et al., 2016). It is interesting that physical illnesses do not hold the same weight of fear and embarrassment as mental illness. Recent studies have shown that outward sharing of physical disease can be beneficial but sharing knowledge about mental illness can be detrimental or simply ignored (Angermeyer & Dietrich, 2006, as cited in Mannarini & Rossi, 2019).

Additionally, employees may be unaware of the available mental health resources that are offered through their organization or how to access them (Oakie et al., 2018). During orientation or a training period, healthcare employees may initially receive information about stress management or self-care practices, but without consistent reinforcement or continued awareness of these resources, they easily forget about the availability or how to access them (Vally, 2018). In many healthcare related organizations, mental health resources or stress management practices are often recommended after an issue has transpired instead of preventatively and consistently to prevent burnout, stress, and mental health conditions from occurring (Perry et al., 2015). Because of this lack of awareness and access to resources and the harmful effects of stigma, employees may be hesitant to utilize counseling services or be unaware of mental health care resources offered from their workplace; and mental illness left untreated can cause severe dysfunction in both personal or professional life (Vasconcelos et al., 2016; Hanisch et al., 2016).

Interventions to decrease barriers to accessing mental health care. It can be a struggle living with mental illness as it may cause disruptions in one's professional and personal life, so prompt detection and treatment is key. Reducing mental illness stigma may be as simple as being open to conversing about mental health and education to improve mental health literacy (Knaak et al., 2017; Maranzan, 2016; Greenstein, 2017).

It used to be taboo to talk about cancer; however, this has undergone significant transformations of reduced stigmatization over the last few decades and presently, conversations about cancer no longer hold the weight of stigma as before (Greenstein, 2017; Knapp, Marziliano, & Moyer, 2014). Mental health education has been shown to decrease the stigma for mental disorders and improve mental health literacy (Greenstein, 2017). Mental health education involves providing factual information about mental health conditions, what mental illness may look like, and the prevalence of MHD. (Stuart, 2016; The National Academics of Science, Engineering, Medicine, 2016; Maranzan, 2016; Knaak et al., 2017). It also includes disproving myths and false information about mental illness to contradict negative feelings and beliefs about those with mental illness (Stuart, 2016; The National Academics of Science, Engineering, Medicine, 2016; Maranzan, 2016; Knaak et al., 2017). This intervention has shown to be successful in reducing stigma which is one of the largest barriers to accessing mental health care (Oakie et al., 2018; Maranzan, 2016; Knaak et al., 2017).

Increasing awareness about mental health disorders and resources for self-care and stress management have also been successful for decreasing barriers to accessing care. Individuals with mental health disorders may experience self-stigma which involves feelings of shame, inadequacy and weakness (Mittal, Sullivan, Chekuri, Allee, & Corrigan, 2012). This can be a deterrent for seeking professional mental health care. It is suggested that increasing awareness of

self-help mental health resources can create a significant opportunity for individuals to learn more about mental health and may lead to increased utilization of professional mental health services (Levin, Krafft, & Levin, 2018). Self-help interventions to improve awareness of mental illness can be a cost effective and convenient method to decrease stigma. (Levin, Krafft, & Levin, 2018; Mittal et al., 2012).

Organizations also need to be actively involved in mental healthcare promotion. Levin, Krafft, & Levin, (2018) stress the importance of organizations providing clear resources and opportunities to access self-help materials as part of their outreach efforts to support mental health and decrease stigma or as an alternative treatment option for individuals unwilling to engage in professional counseling. Organizations can provide tailored and relevant anti-stigma interventions to their targeted audience which may have a more significant and longer lasting affect than public campaigns that provide generalized information (Hanisch et al., 2016; Oakie et al., 2018).

Education and visible information on self-help and stress management should not only be provided during a training period or reactively after an individual expresses distress (Vally, 2018). Organizations can play an active role in promoting an ongoing culture in supporting mental health treatment and stressing the importance of self-care (Vally, 2018; Levin, Krafft & Levin, 2018; Hanisch et al., 2016). When organizational support was present, individuals were more likely to continue using stress management or self-help strategies during the rest of their career (Vally, 2018; Levin, Krafft, & Levin, 2018). Consistent workplace anti-stigma or mental health awareness interventions are not only beneficial for reducing stigma attitudes and behavior and promoting a supportive environment, but it can also lead to earlier help-seeking behavior for

individuals who are dealing with MHD by providing them factual information about mental illness and awareness of resources available to them (Hanisch et al., 2016; Oakie et al., 2018).

When mental health interventions included education about mental illness to reduce stigma and awareness about mental health resources available, there were significant improvements in outcomes including increased knowledge, mental health promotion intentions, and willingness to seek help or mental health care (Oakie et al., 2018). Even when these interventions or training programs were brief, there was still potential for long lasting effects of perceptions and knowledge on mental health and increased help-seeking (Oakie et al., 2018).

Evidence Based Practice: Verification of Chosen Option

This was a quality improvement project utilizing an educational intervention to reduce barriers to accessing mental health care treatment for acute care nurses. The DNP student provided factual information about MHD, mental illness stigma, and increased awareness of and access to self-care and stress management resources. The educational intervention included a short presentation that defined mental illness and specific mental health disorders that nurses commonly experience (e.g. anxiety, depression, panic disorder), the prevalence, what these disorders may look like, what mental illness stigma is, how mental illness stigma is a barrier to accessing care, treatment (e.g. self-care, stress management strategies, professional mental health care), a list of organizational resources available for the nurses, and a list of additional resources not associated with the organization.

In addition to this, there were multiple areas around the unit including the nurses' station and break room where information on stress management and self-care practices that can be performed at work or at home (e.g. brief meditation techniques including mindfulness, body scan, and breath awareness) and information on the many available mental health resources for

the staff where made easily accessible (e.g. Employee Assistance Programs; how to find a therapist or psychiatrist; CODE YOU, which is a hotline for nurses that offers free confidential peer support over the phone from co-workers who are specially trained to help overcome workplace stressors; and a website associated with the organization that provides education, videos, audio clips, and webinars about mental health disorders and how to manage them).

Theoretical Framework/Evidence Based Practice Model

Goffman's (1963) theory of stigma was the underlying framework for the basis of this project. Goffman defines stigma as a phenomenon where an individual possesses a specific trait or attribute that is perceived as abnormal, disgraceful, or negative by the rest of society (1963). Stigma is a relationship between an attribute and the negative stereotype related to that attribute. Goffman breaks down stigma into three different types.

The first type of stigma is related to physical deformities. The second type of stigmas are based upon the deformities of a person's character (example: mental disorders, addiction, homosexuality, radical political behaviors, etc.). Lastly, there are tribal stigmas that are related to a person's race, nationality and religion. The "normals" or the non-stigmatized group are the ones who create the culture of normalcy and decide what is acceptable and not acceptable in the society (Goffman, 1963). Those with mental illness would be a part of the second type of stigma – the stigma of character traits or deformities (Goffman, 1963). Goffman mentions that some stigmatized people try to hide their stigma as a way to try to fit in with the rest of society. However, this can be very detrimental as it can lead to further isolation, insecurities, poor coping mechanisms such as substance abuse or self-harm.

Left untreated, mental health disorders can be incapacitating, especially for healthcare providers. Nurses have a responsibility to provide safe and quality care to their patients.

However, mental illness and substance abuse can result from lack of self-care and mental health awareness. This framework guides the implementation strategy by using education to reduce mental illness stigma in attempts to decrease the barriers to accessing mental health care among acute care nurses.

Project Design

This quality improvement project design was an educational intervention to decrease barriers to accessing mental health care for acute care nurses. The data was collected by use of the OMS-HC to assess mental health literacy, attitudes about mental illness, and willingness to seek out mental healthcare prior to and after delivery of the intervention. A focus group was also conducted so that the nurses could ask questions or provide additional comments. Research has shown that stigma reduction and awareness and access to mental health care, self-care, and stress management resources are beneficial in decreasing barriers to accessing mental healthcare. This project followed the Plan-Do-Check-Act (PDCA) management model.

Plan

Reviewed literature on how the stigma of mental illness and lack of awareness of resources can be a significant barrier for nurses to access mental health care and can lead to poor patient outcomes and poor mental health. Identified evidence-based interventions to decrease levels of stigma and education, resources, and treatment options available to the nursing staff. Identified ways to increase awareness and access to mental health resources that are available to the staff.

Do

Administered the OMS-HC assessing mental health literacy, attitudes about mental illness, and willingness to seek out mental healthcare among acute care nurses. Presented an

educational intervention that included factual information about mental health disorders that nurses commonly experience (e.g. anxiety, depression, panic disorder), the prevalence, what these disorders may look like, what mental illness stigma is, how mental illness stigma is a barrier to accessing care, treatment (e.g. self-care, stress management strategies, professional mental health care), a list of organizational resources available for the nurses, and a list of additional resources not associated with the organization.

There were also multiple areas around the unit including the nurses' station and break room that had information on stress management and self-care practices that could be performed at work or at home and information on the many available mental health resources for the staff.

Check

One month later, the nurses completed the same questionnaire to assess for changes in mental health literacy, attitudes about mental illness, and willingness to seek out mental healthcare. The DNP student noted if there were reductions in stigma, increases in mental health literacy, or increases in help seeking behavior from the results of the questionnaire.

Act

A small focus group took place for the nurses on the unit to have an opportunity to ask questions, mention concerns, share stories, provide valuable feedback to improve the intervention, or suggest other interventions that might have helped to reduce stigma, increase awareness of resources, or decrease other potential barriers to accessing mental healthcare.

Methods

Gap analysis

This project was implemented at an acute care 23 bed oncology medical surgical unit in a large teaching hospital in the Midwest. The unit is staffed by 39 registered nurses, 8 patient care technicians, and support staff. The unit primarily cares for patients with oncological, hematological or autoimmune conditions, pre-and post-surgical patients, palliative/hospice patients, and patients with common medical conditions (hypertension, diabetes mellitus, kidney disease, pancreatitis, etc.). The nurses and patient care technicians typically work three 12-hour shifts per week. Inclusion criteria comprised of acute care registered nurses. Doctors, nurse practitioners, physician assistants, patient care technicians and other health care providers or ancillary staff were excluded from the questionnaire, but had access to the mental health information and resources that were presented around the unit and staff break room.

Prior to the initiation of this project, there was no information present on the unit that described mental health resources available to employees. The few resources that were available were posted in public areas around the hospitals, which may make it problematic to inquire discreetly. Staffing patterns at this hospital can make it difficult for nurses to take the time to access mental health care or debrief after dealing with stressful situations. There are no options for nurses to work anything other than 12-hour shifts. Unit observations by the DNP student showed how frequently the nurses work short staffed, and how often nurses were encouraged with hospital-based incentives to work overtime to meet the needs of the unit.

The DNP student observed that during the monthly staff meetings and unit in-services, the focus would primarily be on policies and procedures, new equipment, or patient care issues. There was rarely any discussion on self-care practices or how to handle the stress of the daily

workload. The nurses on the unit often receive regular reminders from administration about the importance of taking a full 30-minute uninterrupted lunch break and additional rest breaks to combat fatigue and exhaustion. However, this rarely occurs due to constant staffing shortages of nurses and other ancillary staff, unsafe nurse to patient ratios, increasingly higher levels of patient acuity, and lack of necessary equipment and resources due to hospital wide budget issues.

Recently, there has been a shortage of patient care technicians and phlebotomists throughout the hospital, and so nurses have been required to temporarily perform these tasks until the positions get filled. However, they are still required to maintain the same nurse to patient ratio. Nurses on the unit are reporting feeling stressed, overwhelmed or exhausted as they are continuously being stretched thin since they can perform the majority of the roles of the other ancillary staff (e.g. patient care technician, secretary, phlebotomy, etc.), but no one else can perform the role of the nurse. Although this is a temporary inconvenience, continued stress, fatigue, burnout, and exhaustion can have some lasting effects.

During the new hire orientation, employees were informed that they were eligible to receive five free counseling sessions from a licensed mental health professional through the organization's Employee Assistance Program (EAP), but since then, it was never mentioned again. There were no training sessions or education about how the stressors from the job could impact mental health. There was limited continuing education about self-care and stress management available for the nurses. Managers and supervisors are overly concerned with how to provide the best care to the patients but may often forget that the quality of patient care depends on the health and motivation of the staff (Vasconcelos et al., 2016). Therefore, one might ask, how can nurses provide quality care to the patients, when they aren't caring for themselves?

Measurement Instruments

In order to measure the outcomes of this DNP Project the following instrument was used: The Opening Minds Scale for Health Care Providers (OMS-HC) (See Appendix A). This test was developed to assess the effects of anti-stigma interventions among health care providers and has been validated by multiple methods proving to be a credible measure of anti-stigma interventions among health care providers (Modgill, Patten, Knaak, Kassam, & Szeto, 2014; Knaak et al., 2017; Maas et al., 2017; Kassam, Papish, Modgill, & Patten, 2012; Wei, Mcgrath, Hayden, & Kutcher, 2017).

The OMS-HC was used as the questionnaire to assess stigma and willingness to use mental health resources before and after the intervention. The scaling responses was on a 5- point Likert scale and 1=Strong disagree, 2 = Disagree, 3 = Neither agree nor disagree, 4 = Agree, and 5 = Strongly agree. Scores could range from 20 to 100 with a lower score indicating lower levels of stigma and a higher score indicating higher levels of stigma. Items 3, 8, 9, 10, 11, 15, 19 required reverse coding. The stigma scale assesses several factors of stigma including health care providers' attitudes and beliefs about individuals with mental illness, their knowledge about mental illness, their comfort level with disclosing their own mental illness or seeking help, and their comfort level of being near someone with a mental health disorder. The pre-intervention questionnaire also included three questions regarding characteristics of the sample (see Appendix B).

Both quantitative and qualitative measures were used to analyze and interpret the outcomes of the educational interventions. Descriptive method included pre- and post-intervention results from the OMS-HC questionnaire. Qualitative measures included explanatory methods taken from the questions, suggestions, discussion, and personal stories from the focus

group, casual conversations with the nurses about the project, and DNP student journal notes of the experiences during the project implementation.

Prior to the educational intervention, the nurses on the unit received information about this project 1-2 weeks before the educational intervention during the twice a day staff huddle and at the prior monthly staff meeting. Potential participants were given an opportunity to ask questions about the participation requirements. Contact information was made available on the unit to contact the DNP student at any time with questions or concerns. The OMS-HC questionnaire was administered to twelve registered nurses who agreed to participate in the project during a unit staff meeting to assess for baseline knowledge, attitudes about mental illness, and willingness to utilize mental health resources. Anonymity was ensured by allowing each participant to create and write a random passcode on the top of the survey using the month of their birthday and the last two numbers of their postal zip code. No other identifiable information was collected.

After taking the pre-questionnaire, the nurses viewed an educational presentation developed by the DNP student with the most recent evidence-based information to provide factual information on mental health disorders, mental illness stigma, and resources/treatment available. Throughout the implementation of the project, there were visible resources posted throughout the unit with information about mental health education, available resources, and brief exercises for stress management and self-care. The implementation process took place over one month to allow for the nurses to have the opportunity to review the self-care and stress management resources. The DNP student was also available during scheduled shifts for questions or comments when appropriate.

After one month, at the following staff meeting, eight registered nurses took the same OMS-HC post-questionnaire to assess stigma and willingness to utilize mental healthcare resources. The DNP student recorded and analyzed the results. Each survey was identified by the random passcode created by the participant so that they could be completed and analyzed without directly identifying the subjects. The results were analyzed with descriptive statistics of the mean and median scores with a standard deviation. A focus group was conducted after the post-implementation and comments and feedback from the participants were noted and analyzed for commonalities and differences. The DNP student also kept a journal of the experience which was analyzed for common themes.

Ethical Considerations/Protection of Human Subjects

The University of Massachusetts, Amherst (UMass) Internal Review Board (IRB) approval was obtained prior to initiating the DNP project. The official IRB Determination Form was submitted as soon as the proposal was approved. This project did not involve any patients or patient health information. The DNP student carefully conducted this project following the *Standards of Care* for practice in an acute care setting. All information collected as part of evaluating the impact of this project was aggregated data from the project participants and did not include any potential identifiers. Anonymity was ensured by allowing each participant to create and write a random passcode on the top of the survey using the month of their birthday and the last two numbers of their postal zip code. No other identifiable information was collected. All completed questionnaires were stored in a locked file cabinet and the DNP student was the only person with access to its contents.

Outcomes and Results

Goals, Objectives, and Expected Outcomes

The goal for this quality improvement project was to decrease barriers to accessing mental health care by reduce mental illness stigma among acute care nurses and increasing awareness and access to mental health resources.

- Goal 1: Assess nurses' mental health literacy, attitudes about mental illness, and willingness to seek out mental healthcare.
    - Objective: Administer The Opening Minds Scale for Health Care Providers (OMS-HC) questionnaire during the monthly staff meeting to the 39 RNs on an acute care oncology medical surgical unit at a large teaching hospital to assess baseline knowledge regarding mental health, attitudes about mental illness, and willingness to seek out mental healthcare.
    - Outcome: 30% of RNs on the unit participated in the questionnaire.
- Goal 2: Deliver an educational intervention to the nurses about MHD, mental illness stigma, self-care and stress management resources available to staff
    - Objective: Provide factual information about mental illness, what it looks like, how common it is, barriers to accessing treatment, and how to seek treatment.
    - Objective: Increase awareness and access to mental healthcare, self-care and stress management resources to the nurses.
    - Outcome: 30% of RNs on the unit participated in the educational intervention
- Goal 3: Assess nurses' mental health literacy, attitudes about mental illness, and willingness to seek out mental healthcare.

- Objective: Administer the OMS-HC to the acute care nurses after the educational intervention at the following monthly staff meeting. Additionally, the DNP student will conduct a small focus group comprising of 4-5 RNs on the unit for discussion, to answer questions, and to collect qualitative statements.
- Outcome: There was an increase in mental health literacy, decrease in mental health stigma, and increase in willingness to seek out mental health care.

Results

The pre-intervention questionnaire included characteristics of the sample (see Table 1) and the administration of the OMS-HC questionnaire via paper and pen (See Appendix A). Characteristics of the sample included 3 questions.

Table 1. *Characteristics of the Sample*

	N	**Percent**
Do you know a close friend or family member with mental illness?		
Yes	11	91.7
No	1	8.3
I do not know	0	0
Have you ever been treated for mental illness?		
Yes	3	25
No	9	75
Prefer not to answer	0	0

Have you ever treated a person with mental illness?		
Yes	12	100
No	0	0
I do not know	0	0

The pre-intervention questionnaire indicated that nearly all participants (91.7%) selected that they knew of a close friend or family member with mental illness. However, only 25% of the participants indicated that they themselves had been treated for mental illness. This is significantly less than the national average. In the United States, roughly 42.6% of adults living with MHD have received treatment in the past year (NIMH, 2017). One might assume that the percentage of those who had received treatment would be higher especially since acute care nurses deal with intense amounts of stress, long hours, and care for the sick and the dying. Additionally, one would assume that nurses would be more knowledgeable about MHD than the general public and more willing to seek treatment. However, the results do not support these assumptions. This may be a reflection of the deep-rooted stigma around mental illness, the participants lacking a clear definition of mental illness, and/or their self-perceptions. Also, not everyone has access to mental health treatment. Lastly, 100% of the participants revealed that they had treated a person with mental illness.

The participants then completed the OMS-HC questionnaire using a pen and paper version of the test after the DNP student gave instructions. The results of the pre-questionnaire are presented in table 2.

Table 2. *OMS-HC Pre-intervention Scores*

	N	Min	Max	Mean	Median	SD
OMS-HC Pre-questionnaire	12	40	59	48.67	48	5.98

The lowest an individual could score on this questionnaire was 20 and the highest was 100. Most of the participants scored towards the low center, suggesting lower to average levels of stigma at baseline. There were also not very many outliers. The mean and median are almost the same, indicating that the pre-intervention scores were very homogenous. The standard deviation falls only slightly outside the typical margin of error.

After the participants filled out the pre-intervention questionnaire, the DNP student gave an educational presentation that defined mental illness and specific mental health disorders that nurses commonly experience (e.g. anxiety, depression, panic disorder), the prevalence, what these disorders may look like, what mental illness stigma is, how mental illness stigma is a barrier to accessing care, treatment (e.g. self-care, stress management strategies, professional mental health care), a list of organizational resources available for the nurses, and a list of additional resources not associated with the organization. Additionally, the DNP student posted information around the unit including the break room and the nurses' station about stress management and self-care practices that can be performed at work or at home (e.g. brief meditation techniques including mindfulness, body scan, and breath awareness) and information on the many available mental health resources for the staff (e.g. Employee Assistance Programs, how to find a therapist or psychiatrist, 5 free counseling sessions from a licensed mental health professional, a hotline for nurses that offers free confidential peer support over the phone from co-workers who are specially trained to help overcome workplace stressors, and a website

associated with the organization that provides education, videos, audio clips, and webinars about mental health disorders and how to manage them).

After one month, the participants were given the opportunity to complete the OMS-HC questionnaire again at the unit staff meeting. A summary of the results of the post-questionnaires are listed in table 4.

Table 4: *OMS-HC Post-intervention Scores*

	N	Min	Max	Mean	Median	SD
OMS-HC Post-questionnaire	8	37	56	47	48	5.96

The minimum and maximum decreased slightly, but the mean and median were very similar to the pre-intervention scores. The standard deviation was also almost identical to the pre-intervention scores. This suggests that one or two of the participants may have changed their attitudes regarding stigma due to the interventions, but most stayed the same. The interventions may have made a tiny change in a positive direction. Long term change is difficult, so this was an expected finding. Additionally, there were only eight participants who took the post intervention questionnaire compared to the original twelve, so the sample decreased by a third. This could have affected the data as well. However, the results from the qualitative data was quite noteworthy.

A focus group was conducted for the participants to provide feedback and ask questions. One participant confided that she would rather take care of physically critical ill patient that kept her busy the entire shift than a mental health patient that was agitated or impulsive and required frequent rounding for safety. She relayed that she often felt annoyed having to reinforce

education and safety precautions on a regular basis to the patients with psychiatric issues that were on our unit. Another participant shared that she often feels intimidated when she has a patient with severe mental health issues because of the infrequency of these patients being admitted on the unit and unfamiliarity with the type of care they require. She mentioned not feeling as confident or comfortable when providing care for them. Often times, when a nurse thinks about mental health patients, they may think of the extreme cases, for example, the agitated combative patients, the alcohol withdrawal patients who are experiencing seizures or delirium. They may not realize that the physical can affect the emotional/mental. Receiving a diagnosis of cancer or a chronic health condition may cause symptoms of depression and anxiety. The patient may start to disengage, refuse to do activities of daily living/hygiene care, refuse to get out of bed, may have an increased or decreased appetite, or present with a flat affect. The "quiet" depressed patient may be overlooked as having a mental health issue that needs addressing. Although, none of these nurses work on a behavioral health unit, they likely care for patients with mental health conditions more than they think and should be assessing their patients for development or exacerbation of mental health disorders.

Another participant mentioned a few occasions when she needed to call off work for a mental health day but would lie and say that she was physically ill because she was worried about what the charge nurse or nursing supervisor would say if she told them the real reason. Another participant mentioned that she had no idea about any of the mental health resources the hospital offered until this project and mentioned that they need to do a better job about educating the staff about their mental health. The healthcare organization routinely requires staff members to participate in online educational videos to stay up to date on current protocols, practices, or

changes within the standard of health care; however, she mentioned that she's never seen a required educational video about mental health care related to the stressors of the job.

The DNP journal presented with two common themes: curiosity regarding the topic for the project and openness to mental health conversation. A few nurses on the unit appeared to be surprised and curious about the reason the DNP student chose to do her project on mental health. A few nurses asked why the DNP chose a project on mental health and if the DNP student was planning on working in mental health after graduating. Another nurse directly asked the DNP student if she had mental health issues and if that was why she chose this project on mental health care. This was an interesting question, and also slightly invasive. Nonetheless, the topic of this project sparked healthy conversation about mental health. Two nurses on the unit engaged in conversations with the DNP student about their own mental health struggles and how stressful and overwhelming nursing can be at times. One nurse mentioned that she was recently thinking about finding a therapist/counselor after recently having a miscarriage. She had forgotten about the 5 free counseling sessions offered through our EAP and thanked the DNP student for posting the mental health resource information in the break room.

Discussion

The anticipated outcome for this project was to reduce mental illness stigma and increase awareness of mental health resources for acute care nurses in efforts to decrease barriers in accessing mental health care. Participation was a significant barrier to implementation of this project. The nurses on the unit were routinely reminded about the project during the staff huddle twice a day at change of shift for one week prior to the initiation of the project. In addition to this, all employees are regularly encouraged to attend at least 8 out of the staff meetings and are paid for their time. Snacks were also provided for the focus group to encourage attendance and

participation. In spite of this, participation was still low. Out of the 39 registered nurses on the unit, less than 1/3rd participated in the pre-implementation and educational intervention, and less than 1/4th participated in the post-intervention and focus group. It appeared that the majority of the nurses did not want to talk openly about mental illness and the stigma surrounding it, but some would disclose privately with the DNP student about their thoughts and comments about the project, and their personal history with mental illness.

This quality improvement project addressed two of the six aims developed by the Institution of Medicine to improve healthcare quality by promoting safety and efficiency. The stigma of mental illness can be very costly for organizations due to denial and fear of discovery that can delay treatment, harm productivity, and raise health care costs (Gelb & Corrigan, 2008). When compared to physical disorder, mental health disorders have a substantial impact on productivity, and mental health disorders are some of the most common causes of occupational disability in the United States (NAMI Massachusetts, 2015).

Although there is a vast amount of national and global campaigns and initiatives to reduce mental illness stigma, there is significant evidence recognizing the specific need for workplace interventions and increasing awareness of the resources available to employees (Szeto & Dobson, 2010; Oakie et al., 2018). Untreated mental illness may result in careless behavior, increase in workplace injuries, errors, or near-misses, absenteeism, arriving to work late, decrease in efficiency, and decrease in the quality of care provided to the patients (Stathoupoulou et al., 2011; NAMI Massachusetts, 2015). Additionally, untreated mental illness can lead to poor coping mechanisms (e.g. substance abuse, continued absenteeism) that may impact the nurse's job or license or require the hospital to replace them. The rate for replacing nurses can be

incredibly costly ranging from $10,000 to $88,000 (Kurnat- Thoma, Ganger, Peterson, & Channell, 2017).

Presenteeism, however, is even more costly to an organization when compared to absenteeism and is an indirect cost that refers to a decrease in work productivity that is related to an illness (whether it be mental or physical) (NAMI Massachusetts, 2015). There are studies suggesting that the costs of presenteeism related to mental health disorders and decreased productivity are greater than the costs of medical care, absenteeism and disability combined (NAMI Massachusetts, 2015). Multiple studies have concluded that for every dollar an organization invested into creating a supportive mentally healthy work environment, they received $2.30 in benefits (NAMI Massachusetts, 2015). Overall, the most valuable benefit may be saving a person's life; whether it be the depressed suicidal nurse seeking appropriate help and saving his/her own life, or the nurse seeking help for substance abuse, not utilizing drugs at work, and safely caring for the patient. The costs of reducing stigma are minimal, but the benefits may be substantial.

Conclusion

The unit manager, unit director, and human resources (HR) director were all strong facilitators for this project. The DNP student received approval from the manger and unit director to conduct the educational intervention and questionnaires during the unit staff meetings which cut into the unit's yearly budget as the nurses were paid for their time. Additionally, the HR director assisted with providing the mental health resources, contact information for the nurse that created the CODE YOU hotline, and provided the DNP student with the institutional letter of support. Lastly, the unit manager has allowed for the mental health and self-care

resources to remain accessible and available to the nurses and the other health care personnel in the breakroom on the unit.

The purpose of this educational intervention was to decrease mental health stigma and increase awareness of and access to mental health resources. Although the quantitative data did not show a statistically significant change, the project appeared to increase awareness of and access to mental health resources as stated by participants in the focus group and common themes presented in the DNP student's journal. Mental health stigma appeared to have slightly decreased a result of the intervention, although the sample size was too small to make a definitive conclusion. Stigma, beliefs, and attitudes are very hard to change overnight. Further interventions and reinforcement of education may help to slowly decrease stigma and change people's attitudes around mental illness.

The American Nurse Association (ANA) Code of Ethics for Nurses has specific provisions about nurses providing respect, moral worth, and dignity when caring or interacting with patients, family members, co-workers, and all others (2015). It also states that nurses are responsible for providing those same duties of respect, care, and dignity to themselves (ANA, 2015). It is an ethical mandate that nurses model the same health maintenance and health promotion that they teach to their patients. Fatigue, stress, burnout, and compassion fatigue not only affects the nurse's professional life but it affects their personal life and to mitigate these effects, the ANA stresses the importance and responsibility of nurses to practice good self-care, stress management, and seek professional mental health care when in needed (ANA, 2015).

Nurses are instrumental in providing quality care and reinforcing education and skills to promote health and well-being with their patients, but in order for nurses to safely care for others, they need to start by caring for themselves. Nurses need continuing education and

awareness of the importance of their own mental health and it is the responsibility of the organization to support mental healthcare for the safety and well-being of the nurses and the patients they care for (ANA, 2015). By addressing mental illness stigma and increasing awareness and access to resources, the barriers of seeking mental health care can be broken. This will then allow for nurses to seek mental health treatment to promote their own health and wellbeing and give them the tools to live happier, healthier lives, and provide safe, efficient, and quality care to their patients.

References

American Nurse Association. (2015). Code of ethics for nurses with interpretive statements. Retrieved from https://www.nursingworld.org/coe-view-only

Cares, A., Pace, E., Denious, J., & Crane, L. A. (2014). Substance use and mental illness among nurses: Workplace warning signs and barriers to seeking assistance. *Substance Abuse,* 36(1), 59-66. doi:10.1080/08897077.2014.933725

Gelb, B. D., & Corrigan, P. W. (2008). How managers can lower mental illness costs by reducing stigma. *Business Horizons, 51*(4), 293-300. doi:10.1016/j.bushor.2008.02.001

Gillespie, G. L., Grubb, P. L., Brown, K., Boesch, M. C., & Ulrich, D. (2017). "Nurses Eat Their Young": A Novel Bullying Educational Program for Student Nurses. *Journal of nursing education and practice*, *7*(7), 11–21. doi:10.5430/jnep.v7n7P11

Goffman, E. (1963). *Stigma: Notes on a spoiled identity.* New York, NY: Prentice Hall Inc.

Greenstein, L. (2017). How you can stop mental illness stigma. *National Alliance on Mental Illness*. Retrieved from https://www.nami.org/Blogs/NAMI-Blog/May-2017/How-You-Can-Stop-Mental-Illness-Stigma

Hanisch, S. E., Twomey, C. D., Szeto, A. C., Birner, U. W., Nowak, D., & Sabariego, C. (2016). The effectiveness of interventions targeting the stigma of mental illness at the workplace: A systematic review. *BMC Psychiatry, 16*(1). doi:10.1186/s12888-015-0706-4

Henderson, C., Evans-Lacko, S., & Thornicroft, G. (2013). Mental illness stigma, help seeking, and public health programs. *American Journal of Public Health*, *103*(5), 777-80. doi:10.2105/AJPH.2012.301056

Jones, A. K. (2017). Oncology Nurse Retreat: A Strength-Based Approach to Self-Care and Personal Resilience. *Clinical Journal of Oncology Nursing, 21*(2), 259-262. doi:10.1188/17.cjon.259-262

Kassam, A., Papish, A., Modgill, G., & Patten S. (2012). The development and psychometric properties of a new scale to measure mental illness related stigma by health care providers: The opening minds scale for health care providers (OMS-HC). *BMC Psychiatry, 12*(62), 1-12. Retrieved from http://www.biomedcentral.com/1471-244X/12/62

Keng, S., Smoski, M. J., & Robins, C. J. (2011). Effects of mindfulness on psychological health: A review of empirical studies. *Clinical Psychology Review, 31*(6), 1041-1056. doi:10.1016/j.cpr.2011.04.006

Knaak, S., Mantler, E., & Szeto, A. (2017). Mental illness-related stigma in healthcare: Barriers to access and care and evidence-based solutions. *Healthcare Management Forum, 30*(2), 111-116. doi:10.1177/0840470416679413

Knaak, S., Szeto, A. C., Kassam, A., Hamer, A., Modgill, G., & Patten, S. (2017). Understanding Stigma: A Pooled Analysis of a National Program Aimed at Health Care Providers to Reduce Stigma towards Patients with a Mental Illness. *Journal of Mental Health and Addiction Nursing, 1*(1). doi:10.22374/jmhan.v1i1.19

Knapp, S., Marziliano, A., & Moyer, A. (2014). Identity threat and stigma in cancer patients. *Health Psychology Open, 1*(1), 205510291455228. doi:10.1177/2055102914552281

Kurnat-Thoma, E., Ganger, M., Peterson, K., & Channell, L. (2017). Reducing annual hospital and registered nurse staff turnover: A 10-element onboarding program intervention. *SAGE Open Nursing, 3*, 237796081769771. doi:10.1177/2377960817697712.

Laird, K. T., Tanner-Smith, E. E., Russell, A. C., Hollon, S. D., & Walker, L. S. (2017). Comparative efficacy of psychological therapies for improving mental health and daily functioning in irritable bowel syndrome: A systematic review and meta-analysis. *Clinical Psychology Review, 51*, 142-152. doi:10.1016/j.cpr.2016.11.001

Levin, M. E., Krafft, J., & Levin, C. (2018). Does self-help increase rates of help seeking for student mental health problems by minimizing stigma as a barrier? *Journal of American College Health, 66*(4), 302-309. doi:10.1080/07448481.2018.1440580

Maas, M. V., Stuart, H., Patten, S. B., Lentinello, E. K., Bobbili, S. J., Mann, R. E., . . . Khenti, A. (2017). Examining the Application of the Opening Minds Survey in the Community Health Centre Setting. *The Canadian Journal of Psychiatry, 63*(1), 30-36. doi:10.1177/0706743717719079

Mannarini, S., & Rossi, A. (2019). Assessing Mental Illness Stigma: A Complex Issue. *Frontiers in psychology*, *9*, 2722. doi:10.3389/fpsyg.2018.02722

Maranzan, K. A. (2016). Interprofessional education in mental health: An opportunity to reduce mental illness stigma. *Journal of Interprofessional Care*, *30*(3), 370–377. Retrieved from https://doi-org.silk.library.umass.edu/10.3109/13561820.2016.1146878

Maski, K. (2018). Insufficient sleep: Evaluation and management. *UpToDate.* Retrieved from https://www-uptodate-com.silk.library.umass.edu/contents/insufficient-sleep-evaluation-and-management?search=lack%20of%20sleep%20mental%20health&source=search_result&selectedTitle=7~150&usage_type=default&display_rank=7

Mazurek, M., & Papuć, E. (2018). Stigmatisation of people with dementi. Wiad Lek, 71(6), 1275-1278.

Mittal, D., Sullivan, G., Chekuri, L., Allee, E., & Corrigan, P. W. (2012). Empirical Studies of Self-Stigma Reduction Strategies: A Critical Review of the Literature. *Psychiatric Services, 63*(10), 974-981. doi:10.1176/appi.ps.201100459

Modgill, G., Patten, S. B., Knaak, S., Kassam, A., & Szeto, A. C. H. (2014). Opening minds stigma scale for health care providers (OMS-HC): Examination of psychometric properties and responsiveness. *BMC Psychiatry, 14*(120), 1-10. Retrieved from https://bmcpsychiatry.biomedcentral.com/articles/10.1186/1471-244X-14-120

National Alliance of Mental Illness of Massachusetts. (2015). Bad for business: The business case for overcoming mental illness stigma in the workplace. Retrieved from http://ceos.namimass.org/wp-content/uploads/2015/03/BAD-FOR-BUSINESS.pdf

National Institute of Mental Health (NIMH). (2017a). Any anxiety disorder. Retrieved from https://www.nimh.nih.gov/health/statistics/any-anxiety-disorder.shtml#part_155094

National Institute of Mental Health (NIMH). (2017b). *Mental illness.* Retrieved from https://www.nimh.nih.gov/health/statistics/mental-illness.shtml

National Institute of Mental Health (NIMH). (2019). Major depression. Retrieved from https://www.nimh.nih.gov/health/statistics/major-depression.shtml#part_155029

Nooryan, K., Gasparyan, K., Sharif, F., & Zoladl, M. (2012). Controlling anxiety in physicians and nurses working in intensive care units using emotional intelligence items as an anxiety management tool in Iran. *International journal of general medicine*, *5*, 5–10. doi:10.2147/IJGM.S25850

Oakie, T., Smith, N. A., Dimoff, J. K., & Kelloway, E. K. (2018). Coworker health awareness training: An evaluation. *Journal of Applied Biobehavioral Research, 23*(4). doi:10.1111/jabr.12148

Ong, Y. Z., Siddiqui, S., John, S., Chen, Z., & Chang, S. (2016). The prevalence of post-traumatic stress disorder in intensive care unit staff and the common coping strategies used. *Annals Academy of Medicine, 45*(5). 215-218. Retrieved from http://www.annals.edu.sg/pdf/45VolNo5May2016/V45N5p215.pdf

Perry, L., Lamont, S., Brunero, S., Gallagher, R., & Duffield, C. (2015). The mental health of nurses in acute teaching hospital settings: A cross-sectional survey. *BMC Nursing, 14*(1). doi:10.1186/s12912-015-0068-8

Rössler W. (2016). The stigma of mental disorders: A millennia-long history of social exclusion and prejudices. *EMBO reports*, *17*(9), 1250–1253. doi:10.15252/embr.201643041

Stathopoulou, H., Karanikola, M. N., Panagiotopoulou, F., & Papathanassoglou, E. D. (2011). Anxiety levels and related symptoms in emergency nursing personnel in Greece. *Journal of Emergency Nursing, 37*(4), 314-320. doi:10.1016/j.jen.2010.03.006

Stuart, H. (2016). Reducing the stigma of mental illness. *Global Mental Health, 3*. doi:10.1017/gmh.2016.11

Stubbs, A. (2014). Reducing mental illness stigma in health care students and professionals: A review of the literature. *Australasian Psychiatry*, *22*(6), 579–584. https://doi.org/10.1177/1039856214556324

Szeto, A. C., & Dobson, K. S. (2010). Reducing the stigma of mental disorders at work: A review of current workplace anti-stigma intervention programs. *Applied and Preventive Psychology, 14*(1-4), 41-56. doi:10.1016/j.appsy.2011.11.002

The National Academics of Science, Engineering, Medicine. (2016). Ending discrimination against people with mental and substance use disorders: The evidence for stigma change. Retrieved from https://www.ncbi.nlm.nih.gov/books/NBK384915/

Tsaras, K., Papathanasiou, I. V., Vus, V., Panagiotopoulou, A., Katsou, M. A., Kelesi, M., & Fradelos, E. C. (2018). Predicting Factors of Depression and Anxiety in Mental Health Nurses: A Quantitative Cross-Sectional Study. *Medical archives (Sarajevo, Bosnia and Herzegovina)*, *72*(1), 62–67. doi:10.5455/medarh.2017.72.62-67

Vasconcelos, S. C., Souza, S. L., Sougey, E. B., Ribeiro, E. C., Nascimento, J. J., Formiga, M. B., . . . Silva, A. O. (2016). Nursing staff members mental's health and factors associated with the work process: An integrative review. *Clinical Practice & Epidemiology in Mental Health, 12*(1), 167-176. doi:10.2174/1745017901612010167

Vally, Z. (2018). Mental health stigma continues to impede help-seeking and self-care efforts among trainees in mental health professions. *Perspectives in Psychiatric Care, 55*(2), 161-162. doi:10.1111/ppc.12294

Wei, Y., Mcgrath, P., Hayden, J., & Kutcher, S. (2017). The quality of mental health literacy measurement tools evaluating the stigma of mental illness: A systematic review. *Epidemiology and Psychiatric Sciences, 27*(5), 433-462. doi:10.1017/s2045796017000178

World Health Organization. (2018). Mental disorders. Retrieved from https://www.who.int/en/news-room/fact-sheets/detail/mental-disorders

Appendix A

Table 1: Opening Minds Scale for Health Care Providers (OMS-HC)

PLEASE READ INSTRUCTIONS CAREFULLY

The following questionnaire contains a series of statements about individuals with mental health disorders. Read each statement and indicate how much you agree or disagree with each of the statements. There are no wrong or right answers and responses will remain anonymous.

Statement	1 Strongly Disagree	2 Disagree	3 Neither Disagree nor Agree	4 Agree	5 Strongly Agree
1. I am more comfortable helping a person who has a physical illness than I am helping a person who has a mental illness.					
2. If a person with a mental illness complains of physical symptoms (e.g. nausea, back pain or headache), I would likely attribute this to their mental illness.					
3. If a colleague with whom I work told me they had a managed mental illness, I would be as willing to work with him/her.					
4. If I were under treatment for a mental illness, I would not disclose this to any of my colleagues					
5. I would be more inclined to seek help for a mental illness if my treating healthcare provider was not associated with my workplace.					
6. I would see myself as weak if I had a mental illness and could not fix it myself.					
7. I would be reluctant to seek help if I had a mental illness.					
8. Employers should hire a person with a managed mental illness if he/she is the best person for the job.					
9. I would still go to a physician if I knew that the physician had been treated for a mental illness.					
10. If I had a mental illness, I would tell my friends.					

Statement	1 Strongly Disagree	2 Disagree	3 Neither Disagree nor Agree	4 Agree	5 Strongly Agree
11. It is the responsibility of health care providers to inspire hope in people with mental illness.					
12. Despite my professional beliefs, I have negative reactions towards people who have mental illness.					
13. There is little I can do to help people with mental illness.					
14. More than half of people with mental illness don't try hard enough to get better.					
15. People with mental illness seldom pose a risk to the public.					
16. The best treatment for mental illness is medication.					
17. I would not want a person with a mental illness, even if it were appropriately managed, to work with children.					
18. Healthcare providers do not need to be advocates for people with mental illness.					
19. I would not mind if a person with a mental illness lived next door to me.					
20. I struggle to feel compassion for a person with a mental illness.					

Note: "The development and psychometric properties of a new scale to measure mental illness related stigma by health care providers: The opening minds scale for Health Care Providers (OMS-HC)," by A. Kassam, A. Papish, G. Modgill, & S. Patten, 2012, *BMC Psychiatry, 12*(62), 9.

Appendix B

Table 2. *Characteristics of the Sample*

	N	Percent
Do you know a close friend or family member with mental illness?		
Yes	11	91.7
No	1	8.3
I do not know	0	0
Have you ever been treated for mental illness?		
Yes	3	25
No	9	75
Prefer not to answer	0	0
Have you ever treated a person with mental illness?		
Yes	12	100
No	0	0
I do not know	0	0

Note: "Opening minds stigma scale for health care providers (OMS-HC): Examination of psychometric properties and responsiveness" by G. Modgill, S. B. Patten, S. Knaak, A. Kassm, & A. C. H. Szeto, 2014, *BMC Psychiatry, 14*(120), 5.

Appendix C

Table 5: Costs for Quality Improvement Project

Item	Cost
39 Registered nurses x 20 minutes for educational presentation and pre-post questionnaire (avg $30/hour)	$390
Educational Presentation	$0
Posted resources and information around the unit (cost of 10 pieces of paper at $0.89/colored copy and tape at $3.39)	$12.29
OMS-HC pre- and post-questionnaire	$0
Refreshments for focus group	$100 (estimated guess)
SPSS for descriptive analysis	$59.94
Total Expenses	**$562.23**

Appendix D

Table 6: Timeline for Quality Improvement Project

Task	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	May
Recruitment			X							
Pre-questionnaire				X						
Intervention				X						
1-month post-questionnaire					X					
Focus group					X					
Data analysis					X	X	X			
Presentation of Results										X

Appendix E

Outline of Curriculum

1. Reducing stigma of mental illness among acute care nurses by providing education about mental illness and increasing awareness of and access to resources for self-care and stress management: A quality improvement project to reduce mental illness stigma and decrease barriers to accessing mental health care.
   - Samantha Charles, BSN, RN
   - University of Massachusetts in Amherst
   - DNP capstone project
2. Educational presentation
   - Think about 3 people you know; chances are one of them has experience a mental health disorder in their life.
   - Definition of mental health disorders and prevalence
   - Disprove myths about mental health disorders
   - Mental health disorders that most commonly affect nurses
     - Anxiety, depression, panic attacks (definitions, what it may look like at work)
   - Mental illness stigma
     - Definition, what it looks like, and how it is a barrier to accessing care
   - How untreated mental health disorders can affects professional and personal life
   - How to reduce mental illness stigma
     - Education and awareness of and access to mental health or stress management resources
   - Hospital resources available to staff
     - CODE YOU
     - 5 free counseling sessions through Beacon Health
     - Beacon Health website offering education about mental illness, self-care and stress management activities, and how to find a therapist or psychiatrist
     - Employee assistance programs, mental health benefits through health insurance
   - Outside of the hospital resources available to staff
     - SAMHSA National Helpline
     - NAMI Helpline
     - Psychology Today
       - Find a mental health professional in their area
       - Mental health education from authors who are experts in their field
3. Visible information about mental health disorders, self-care or stress management tips, and resources/treatment available to staff posted around nurses' station and break room.
   - Definitions of depression, anxiety, and panic attacks and what they may look like at work
   - Meditation techniques for stress management that can be performed at work or at home
     - Mindfulness, body scan, breath awareness
   - Tips for managing stress at work (specific for nurses)
   - Resources available for the staff
     - How to find a mental health provider, CODE YOU hotline, Beacon Health website, national helplines, Psychology Today website